

SEQUENCE LISTING

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<110> FIVE PRIME THERAPEUTICS, INC.
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HESTIR, KEVIN
COLLINS, AMY

<120> KIAA0779, SPLICE VARIANTS THEREOF, AND METHODS OF THEIR USE

<130> 08940.0030-00304

<140> PCT/US2004/033408

<141> 2004-10-12

<150> 60/510,612

<151> 2003-10-10

<160> 38

<170> PatentIn version 3.2

<210> 1

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<212> DNA

<213> Homo sapiens

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<212> DNA

<213> Homo sapiens

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<210> 6
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 <212> DNA
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<211> 96
<212> PRT
<213> Homo sapiens

<400> 7
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His Ser Val His Pro Pro Arg Leu Asp Leu Phe Phe Ile Trp Ile Phe
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Cys Phe Tyr Val Phe Leu Lys Asn Asn Phe Leu Gly Asn Leu Leu Asp
35 40 45
Tyr Asn Cys Ser Ser Ser Pro Met Gln Arg Lys Gly Ser Tyr Cys Trp
50 55 60
Asp Phe Glu Glu Met Val Leu Glu Gln Leu Glu Ile His Thr His Thr
65 70 75 80
Lys Asn Leu Asn Pro Tyr Leu Thr Pro Asp Thr Lys Ala Thr Phe Lys
85 90 95

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<211> 76
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<213> Homo sapiens

<400> 8

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His Ser Val His Pro Pro Arg Leu Asp Leu Phe Phe Ile Trp Ile Phe
20 25 30

Cys Phe Tyr Val Phe Leu Lys Asn Asn Phe Leu Gly Asn Leu Leu Asp
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Tyr Asn Cys Ser Ser Ser Pro Met Gln Arg Lys Gly Ser Tyr Cys Trp
50 55 60

Asp Phe Glu Glu Ala Val Arg Cys His Trp Ala Val
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<210> 9
<211> 653
<212> PRT
<213> Homo sapiens

<400> 9
Met Glu Pro Ser Gly Ser Glu Gln Leu Phe Glu Asp Pro Asp Pro Gly
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Gly Lys Ser Gln Asp Ala Glu Ala Arg Lys Gln Thr Glu Ser Glu Gln
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Lys Leu Ser Lys Met Thr His Asn Ala Leu Glu Asn Ile Asn Val Ile
35 40 45

Gly Gln Gly Leu Lys His Leu Phe Gln His Gln Arg Arg Arg Ser Ser
50 55 60

Val Ser Pro His Asp Val Gln Gln Ile Gln Ala Asp Pro Glu Pro Glu
65 70 75 80

Met Asp Leu Glu Ser Gln Asn Ala Cys Ala Glu Ile Asp Gly Val Pro
85 90 95

Thr His Pro Thr Ala Leu Asn Arg Val Leu Gln Gln Ile Arg Val Pro
100 105 110

Pro Lys Met Lys Arg Gly Thr Ser Leu His Ser Arg Arg Gly Lys Pro
115 120 125

Glu Ala Pro Lys Gly Ser Pro Gln Ile Asn Arg Lys Ser Gly Gln Glu
130 135 140

Met Thr Ala Val Met Gln Ser Gly Arg Pro Arg Ser Ser Ser Thr Thr
145 150 155 160

Asp Ala Pro Thr Gly Ser Ala Met Met Glu Ile Ala Cys Ala Ala Ala
165 170 175

Ala Ala Ala Ala Ala Cys Leu Pro Gly Glu Glu Gly Thr Ala Glu Arg
180 185 190

Ile Glu Arg Leu Glu Val Ser Ser Leu Ala Gln Thr Ser Ser Ala Val
195 200 205

Ala Ser Ser Thr Asp Gly Ser Ile His Thr Asp Ser Val Asp Gly Thr
210 215 220

Pro Asp Pro Gln Arg Thr Lys Ala Ala Ile Ala His Leu Gln Gln Lys
225 230 235 240

Ile Leu Lys Leu Thr Glu Gln Ile Lys Ile Ala Gln Thr Ala Arg Asp
245 250 255

Asp Asn Val Ala Glu Tyr Leu Lys Leu Ala Asn Ser Ala Asp Lys Gln
260 265 270

Gln Ala Ala Arg Ile Lys Gln Val Phe Glu Lys Lys Asn Gln Lys Ser
275 280 285

Ala Gln Thr Ile Leu Gln Leu Gln Lys Lys Leu Glu His Tyr His Arg
290 295 300

Lys Leu Arg Glu Val Glu Gln Asn Gly Ile Pro Arg Gln Pro Lys Asp
305 310 315 320

Val Phe Arg Asp Met His Gln Gly Leu Lys Asp Val Gly Ala Lys Val
325 330 335

Thr Gly Phe Ser Glu Gly Val Val Asp Ser Val Lys Gly Gly Phe Ser
340 345 350

Ser Phe Ser Gln Ala Thr His Ser Ala Ala Gly Ala Val Val Ser Lys
355 360 365

Pro Arg Glu Ile Ala Ser Leu Ile Arg Asn Lys Phe Gly Ser Ala Asp
370 375 380

Asn Ile Pro Asn Leu Lys Asp Ser Leu Glu Glu Gly Gln Val Asp Asp
385 390 395 400

Ala Gly Lys Ala Leu Gly Val Ile Ser Asn Phe Gln Ser Ser Pro Lys
405 410 415

Tyr Gly Ser Glu Glu Asp Cys Ser Ser Ala Thr Ser Gly Ser Val Gly
420 425 430

Ala Asn Ser Thr Thr Gly Gly Ile Ala Val Gly Ala Ser Ser Ser Lys
435 440 445

Thr Asn Thr Leu Asp Met Gln Ser Ser Gly Phe Asp Ala Leu Leu His
450 455 460

Glu Ile Gln Glu Ile Arg Glu Thr Gln Ala Arg Leu Glu Glu Ser Phe
465 470 475 480

Glu Thr Leu Lys Glu His Tyr Gln Arg Asp Tyr Ser Leu Ile Met Gln
485 490 495

Thr Leu Gln Glu Glu Arg Tyr Arg Cys Glu Arg Leu Glu Glu Gln Leu
500 505 510

Asn Asp Leu Thr Glu Leu His Gln Asn Glu Ile Leu Asn Leu Lys Gln
515 520 525

Glu Leu Ala Ser Met Glu Glu Lys Ile Ala Tyr Gln Ser Tyr Glu Arg
530 535 540

Ala Arg Asp Ile Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser
545 550 555 560

Lys Met Glu Leu Gln Gln Gln Gln Gln Val Val Gln Leu Glu Gly
565 570 575

Leu Glu Asn Ala Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn Ile

580

585

590

Leu Leu Ala Val Met Ala Val Leu Leu Val Phe Val Ser Thr Val Ala
 595 600 605

Asn Cys Val Val Pro Leu Met Lys Thr Arg Asn Arg Thr Phe Ser Thr
 610 615 620

Leu Phe Leu Val Val Phe Ile Ala Phe Leu Trp Lys His Trp Asp Ala
 625 630 635 640

Leu Phe Ser Tyr Val Glu Arg Phe Phe Ser Ser Pro Arg
 645 650

<210> 10
 <211> 26
 <212> PRT
 <213> Homo sapiens

<400> 10
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His Ser Val His Pro Pro Arg Leu Asp Leu
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<210> 11
 <211> 47
 <212> PRT
 <213> Homo sapiens

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Asn Leu Asn Pro Tyr Leu Thr Pro Asp Thr Lys Ala Thr Phe Lys
 35 40 45

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 <211> 26
 <212> PRT
 <213> Homo sapiens

<400> 12

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1 5 10 15

His Ser Val His Pro Pro Arg Leu Asp Leu
20 25

<210> 13
<211> 27
<212> PRT
<213> Homo sapiens

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Asn Cys Ser Ser Ser Pro Met Gln Arg Lys Gly Ser Tyr Cys Trp Asp
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Phe Glu Glu Ala Val Arg Cys His Trp Ala Val
20 25

<210> 14
<211> 591
<212> PRT
<213> Homo sapiens

<400> 14
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20 25 30

Lys Leu Ser Lys Met Thr His Asn Ala Leu Glu Asn Ile Asn Val Ile
35 40 45

Gly Gln Gly Leu Lys His Leu Phe Gln His Gln Arg Arg Arg Ser Ser
50 55 60

Val Ser Pro His Asp Val Gln Gln Ile Gln Ala Asp Pro Glu Pro Glu
65 70 75 80

Met Asp Leu Glu Ser Gln Asn Ala Cys Ala Glu Ile Asp Gly Val Pro
85 90 95

Thr His Pro Thr Ala Leu Asn Arg Val Leu Gln Gln Ile Arg Val Pro
100 105 110

Pro Lys Met Lys Arg Gly Thr Ser Leu His Ser Arg Arg Gly Lys Pro

115					120					125					
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210						215				220					
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Thr	Gly	Phe	Ser	Glu	Gly	Val	Val	Asp	Ser	Val	Lys	Gly	Gly	Phe	Ser
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Ser Phe Ser Gln Ala Thr His Ser Ala Ala Gly Ala Val Val Ser Lys
355 360 365

Pro Arg Glu Ile Ala Ser Leu Ile Arg Asn Lys Phe Gly Ser Ala Asp
370 375 380

Asn Ile Pro Asn Leu Lys Asp Ser Leu Glu Glu Gly Gln Val Asp Asp
385 390 395 400

Ala Gly Lys Ala Leu Gly Val Ile Ser Asn Phe Gln Ser Ser Pro Lys
405 410 415

Tyr Gly Ser Glu Glu Asp Cys Ser Ser Ala Thr Ser Gly Ser Val Gly
420 425 430

Ala Asn Ser Thr Thr Gly Gly Ile Ala Val Gly Ala Ser Ser Ser Lys
435 440 445

Thr Asn Thr Leu Asp Met Gln Ser Ser Gly Phe Asp Ala Leu Leu His
450 455 460

Glu Ile Gln Glu Ile Arg Glu Thr Gln Ala Arg Leu Glu Glu Ser Phe
465 470 475 480

Glu Thr Leu Lys Glu His Tyr Gln Arg Asp Tyr Ser Leu Ile Met Gln
485 490 495

Thr Leu Gln Glu Glu Arg Tyr Arg Cys Glu Arg Leu Glu Glu Gln Leu
500 505 510

Asn Asp Leu Thr Glu Leu His Gln Asn Glu Ile Leu Asn Leu Lys Gln
515 520 525

Glu Leu Ala Ser Met Glu Glu Lys Ile Ala Tyr Gln Ser Tyr Glu Arg
530 535 540

Ala Arg Asp Ile Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser
545 550 555 560

Lys Met Glu Leu Gln Gln Gln Gln Gln Val Val Gln Leu Glu Gly
565 570 575

Leu Glu Asn Ala Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn
580 585 590

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<212> PRT
<213> Homo sapiens

<400> 15
Met Lys Thr Arg Asn Arg
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<210> 16
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<212> PRT
<213> Homo sapiens

<400> 16
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1 5 10 15

<210> 17
<211> 121
<212> PRT
<213> Homo sapiens

<400> 17
Met Glu Glu Lys Ile Ala Tyr Gln Ser Tyr Glu Arg Ala Arg Asp Ile
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Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser Lys Met Glu Leu
20 25 30

Gln Gln Gln Gln Gln Gln Val Val Gln Leu Glu Gly Leu Glu Asn Ala
35 40 45

Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn Ile Leu Leu Ala Val
50 55 60

Met Ala Val Leu Leu Val Phe Val Ser Thr Val Ala Asn Cys Val Val
65 70 75 80

Pro Leu Met Lys Thr Arg Asn Arg Thr Phe Ser Thr Leu Phe Leu Val
85 90 95

Val Phe Ile Ala Phe Leu Trp Lys His Trp Asp Ala Leu Phe Ser Tyr
100 105 110

Val Glu Arg Phe Phe Ser Ser Pro Arg
115 120

<210> 18
<211> 214
<212> PRT
<213> Homo sapiens

<400> 18
Met Glu Pro Ser Gly Ser Glu Gln Leu Phe Glu Asp Pro Asp Pro Gly
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Gly Lys Ser Gln Asp Ala Glu Ala Arg Lys Gln Thr Glu Ser Glu Gln
20 25 30

Lys Leu Ser Lys Met Thr His Asn Ala Leu Glu Asn Ile Asn Val Ile
35 40 45

Gly Gln Gly Leu Lys His Leu Phe Gln His Gln Arg Arg Arg Ser Ser
50 55 60

Val Ser Pro His Asp Val Gln Gln Ile Gln Ala Asp Pro Glu Pro Glu
65 70 75 80

Met Asp Leu Glu Ser Gln Asn Ala Cys Ala Glu Ile Asp Gly Val Pro
85 90 95

Thr His Pro Thr Ala Leu Asn Arg Val Leu Gln Gln Ile Arg Val Pro
100 105 110

Pro Lys Met Lys Arg Gly Thr Ser Leu His Ser Arg Arg Gly Lys Pro
115 120 125

Glu Ala Pro Lys Gly Ser Pro Gln Ile Asn Arg Lys Ser Gly Gln Glu
130 135 140

Met Thr Ala Val Met Gln Ser Gly Arg Pro Arg Ser Ser Ser Thr Thr
145 150 155 160

Asp Ala Pro Thr Ser Ser Ala Met Met Glu Ile Ala Cys Ala Ala Ala
165 170 175

Ala Ala Ala Ala Ala Cys Leu Pro Gly Glu Met Pro Leu Pro Gly Thr

180

185

190

Phe Trp Ala Asn Ser Ser Thr Ser Ser Trp Leu Ser Trp Gln Ser Phe
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Trp Ser Leu Ser Pro Leu
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<210> 19
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 <213> Homo sapiens

<400> 19
 Met Glu Pro Ser Gly Ser Glu Gln Leu Phe Glu Asp Pro Asp Pro Gly
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 20 25 30

Lys Leu Ser Lys Met Thr His Asn Ala Leu Glu Asn Ile Asn Val Ile
 35 40 45

Gly Gln Gly Leu Lys His Leu Phe Gln His Gln Arg Arg Arg Ser Ser
 50 55 60

Val Ser Pro His Asp Val Gln Gln Ile Gln Ala Asp Pro Glu Pro Glu
 65 70 75 80

Met Asp Leu Glu Ser Gln Asn Ala Cys Ala Glu Ile Asp Gly Val Pro
 85 90 95

Thr His Pro Thr Ala Leu Asn Arg Val Leu Gln Gln Ile Arg Val Pro
 100 105 110

Pro Lys Met Lys Arg Gly Thr Ser Leu His Ser Arg Arg Gly Lys Pro
 115 120 125

Glu Ala Pro Lys Gly Ser Pro Gln Ile Asn Arg Lys Ser Gly Gln Glu
 130 135 140

Met Thr Ala Val Met Gln Ser Gly Arg Pro Arg Ser Ser Ser Thr Thr
 145 150 155 160

Asp Ala Pro Thr Gly Ser Ala Met Met Glu Ile Ala Cys Ala Ala Ala
165 170 175

Ala Ala Ala Ala Ala Cys Leu Pro Gly Glu Glu Gly Thr Ala Glu Arg
180 185 190

Ile Glu Arg Leu Glu Val Ser Ser Leu Ala Gln Thr Ser Ser Ala Val
195 200 205

Ala Ser Ser Thr Asp Gly Ser Ile His Thr Asp Ser Val Asp Gly Thr
210 215 220

Pro Asp Pro Gln Arg Thr Lys Ala Ala Ile Ala His Leu Gln Gln Lys
225 230 235 240

Ile Leu Lys Leu Thr Glu Gln Ile Lys Ile Ala Gln Thr Ala Arg Asp
245 250 255

Asp Asn Val Ala Glu Tyr Leu Lys Leu Ala Asn Ser Ala Asp Lys Gln
260 265 270

Gln Ala Ala Arg Ile Lys Gln Val Phe Glu Lys Lys Asn Gln Lys Ser
275 280 285

Ala Gln Thr Ile Leu Gln Leu Gln Lys Lys Leu Glu His Tyr His Arg
290 295 300

Lys Leu Arg Glu Val Glu Gln Asn Gly Ile Pro Arg Gln Pro Lys Asp
305 310 315 320

Val Phe Arg Asp Met His Gln Gly Leu Lys Asp Val Gly Ala Lys Val
325 330 335

Thr Gly Phe Ser Glu Gly Val Val Asp Ser Val Lys Gly Gly Phe Ser
340 345 350

Ser Phe Ser Gln Ala Thr His Ser Ala Ala Gly Ala Val Val Ser Lys
355 360 365

Pro Arg Glu Ile Ala Ser Leu Ile Arg Asn Lys Phe Gly Ser Ala Asp
370 375 380

Asn Ile Pro Asn Leu Lys Asp Ser Leu Glu Glu Gly Gln Val Asp Asp

385		390		395		400
Ala Gly Lys	Ala Leu Gly Val Ile Ser Asn Phe Gln Ser Ser Pro Lys	405		410		415
Tyr Gly Ser	Glu Glu Asp Cys Ser Ser Ala Thr Ser Gly Ser Val Gly	420		425		430
Ala Asn Ser	Thr Thr Gly Gly Ile Ala Val Gly Ala Ser Ser Ser Lys	435		440		445
Thr Asn Thr	Leu Asp Met Gln Ser Ser Gly Phe Asp Ala Leu Leu His	450		455		460
Glu Ile Gln	Glu Ile Arg Glu Thr Gln Ala Arg Leu Glu Glu Ser Phe	465		470		475
Glu Thr Leu	Lys Glu His Tyr Gln Arg Asp Tyr Ser Leu Ile Met Gln	485		490		495
Thr Leu Gln	Glu Glu Arg Tyr Arg Cys Glu Arg Leu Glu Glu Gln Leu	500		505		510
Asn Asp Leu	Thr Glu Leu His Gln Asn Glu Ile Leu Asn Leu Lys Gln	515		520		525
Glu Leu Ala	Ser Met Glu Glu Lys Ile Ala Tyr Gln Ser Tyr Glu Arg	530		535		540
Ala Arg Asp	Ile Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser	545		550		555
Lys Met Glu	Leu Gln Gln Gln Gln Gln Val Val Gln Leu Glu Gly	565		570		575
Leu Glu Asn	Ala Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn Ile	580		585		590
Leu Leu Ala	Val Met Ala Val Leu Leu Val Phe Val Ser Thr Val Ala	595		600		605
Asn Cys Val	Val Pro Leu Met Lys Thr Arg Asn Arg Thr Phe Ser Thr	610		615		620

Leu Phe Leu Val Val Phe Ile Ala Phe Leu Trp Lys His Trp Asp Ala
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Leu Phe Ser Tyr Val Glu Arg Phe Phe Ser Ser Pro Arg
645 650

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<213> Homo sapiens

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35 40 45

Thr Ala Arg Asn Leu Leu Gly Lys
50 55

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<212> PRT
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<400> 22
Glu Arg Phe Phe Ser Ser Pro Arg
1 5

<210> 23
<211> 23
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<400> 23
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Ala Asn Cys Val Val Pro Leu
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<211> 18
<212> PRT
<213> Homo sapiens

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His Trp

<210> 25
<211> 59
<212> PRT
<213> Homo sapiens

<400> 25
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Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser Lys Met Glu Leu
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35 40 45

Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn
50 55

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<212> PRT
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<400> 26
Met Lys Thr Arg Asn Arg
1 5

<210> 27
<211> 15

<212> PRT
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<400> 27
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<210> 28
<211> 591
<212> PRT
<213> Homo sapiens

<400> 28
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Gly Lys Ser Gln Asp Ala Glu Ala Arg Lys Gln Thr Glu Ser Glu Gln
20 25 30

Lys Leu Ser Lys Met Thr His Asn Ala Leu Glu Asn Ile Asn Val Ile
35 40 45

Gly Gln Gly Leu Lys His Leu Phe Gln His Gln Arg Arg Arg Ser Ser
50 55 60

Val Ser Pro His Asp Val Gln Gln Ile Gln Ala Asp Pro Glu Pro Glu
65 70 75 80

Met Asp Leu Glu Ser Gln Asn Ala Cys Ala Glu Ile Asp Gly Val Pro
85 90 95

Thr His Pro Thr Ala Leu Asn Arg Val Leu Gln Gln Ile Arg Val Pro
100 105 110

Pro Lys Met Lys Arg Gly Thr Ser Leu His Ser Arg Arg Gly Lys Pro
115 120 125

Glu Ala Pro Lys Gly Ser Pro Gln Ile Asn Arg Lys Ser Gly Gln Glu
130 135 140

Met Thr Ala Val Met Gln Ser Gly Arg Pro Arg Ser Ser Ser Thr Thr
145 150 155 160

Asp Ala Pro Thr Gly Ser Ala Met Met Glu Ile Ala Cys Ala Ala Ala
165 170 175

Ala	Ala	Ala	Ala	Ala	Cys	Leu	Pro	Gly	Glu	Glu	Gly	Thr	Ala	Glu	Arg	180	185	190
Ile	Glu	Arg	Leu	Glu	Val	Ser	Ser	Leu	Ala	Gln	Thr	Ser	Ser	Ala	Val	195	200	205
Ala	Ser	Ser	Thr	Asp	Gly	Ser	Ile	His	Thr	Asp	Ser	Val	Asp	Gly	Thr	210	215	220
Pro	Asp	Pro	Gln	Arg	Thr	Lys	Ala	Ala	Ile	Ala	His	Leu	Gln	Gln	Lys	225	230	235
Ile	Leu	Lys	Leu	Thr	Glu	Gln	Ile	Lys	Ile	Ala	Gln	Thr	Ala	Arg	Asp	245	250	255
Asp	Asn	Val	Ala	Glu	Tyr	Leu	Lys	Leu	Ala	Asn	Ser	Ala	Asp	Lys	Gln	260	265	270
Gln	Ala	Ala	Arg	Ile	Lys	Gln	Val	Phe	Glu	Lys	Lys	Asn	Gln	Lys	Ser	275	280	285
Ala	Gln	Thr	Ile	Leu	Gln	Leu	Gln	Lys	Lys	Leu	Glu	His	Tyr	His	Arg	290	295	300
Lys	Leu	Arg	Glu	Val	Glu	Gln	Asn	Gly	Ile	Pro	Arg	Gln	Pro	Lys	Asp	305	310	315
Val	Phe	Arg	Asp	Met	His	Gln	Gly	Leu	Lys	Asp	Val	Gly	Ala	Lys	Val	325	330	335
Thr	Gly	Phe	Ser	Glu	Gly	Val	Val	Asp	Ser	Val	Lys	Gly	Gly	Phe	Ser	340	345	350
Ser	Phe	Ser	Gln	Ala	Thr	His	Ser	Ala	Ala	Gly	Ala	Val	Val	Ser	Lys	355	360	365
Pro	Arg	Glu	Ile	Ala	Ser	Leu	Ile	Arg	Asn	Lys	Phe	Gly	Ser	Ala	Asp	370	375	380
Asn	Ile	Pro	Asn	Leu	Lys	Asp	Ser	Leu	Glu	Glu	Gly	Gln	Val	Asp	Asp	385	390	395

Ala Gly Lys Ala Leu Gly Val Ile Ser Asn Phe Gln Ser Ser Pro Lys
405 410 415

Tyr Gly Ser Glu Glu Asp Cys Ser Ser Ala Thr Ser Gly Ser Val Gly
420 425 430

Ala Asn Ser Thr Thr Gly Gly Ile Ala Val Gly Ala Ser Ser Ser Lys
435 440 445

Thr Asn Thr Leu Asp Met Gln Ser Ser Gly Phe Asp Ala Leu Leu His
450 455 460

Glu Ile Gln Glu Ile Arg Glu Thr Gln Ala Arg Leu Glu Glu Ser Phe
465 470 475 480

Glu Thr Leu Lys Glu His Tyr Gln Arg Asp Tyr Ser Leu Ile Met Gln
485 490 495

Thr Leu Gln Glu Glu Arg Tyr Arg Cys Glu Arg Leu Glu Glu Gln Leu
500 505 510

Asn Asp Leu Thr Glu Leu His Gln Asn Glu Ile Leu Asn Leu Lys Gln
515 520 525

Glu Leu Ala Ser Met Glu Glu Lys Ile Ala Tyr Gln Ser Tyr Glu Arg
530 535 540

Ala Arg Asp Ile Gln Glu Ala Leu Glu Ala Cys Gln Thr Arg Ile Ser
545 550 555 560

Lys Met Glu Leu Gln Gln Gln Gln Gln Val Val Gln Leu Glu Gly
565 570 575

Leu Glu Asn Ala Thr Ala Arg Asn Leu Leu Gly Lys Leu Ile Asn
580 585 590

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<213> Homo sapiens

<400> 29
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1 5

<210> 30
 <211> 15
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 <212> DNA
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1877

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<211> 2801

<212> DNA

<213> Homo sapiens

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 <213> Homo sapiens

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